



Forest Grove Light & Power

Electric Vehicle (EV) Program & Future Infrastructure

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GOAL 6: PROMOTE SUSTAINABLE TRANSPORTATION ALTERNATIVES

6.3 Incorporate electric and/or hybrid vehicles into the City fleet.

6.4 Provide adequate charging stations at public facilities.

Department Goals Align with Council's Goals

The primary goals of L/P:

- Increase awareness and knowledge of electric vehicles (EV) and available electric vehicle charging locations.
- Incorporate EV or Hybrid vehicles into fleet.
- How the Clean Fuels Program works, and how to invest our credits?
- Increase and assure equitable access to electric vehicle charging infrastructure in Forest Grove.

Blink Network

- Forest Grove L&P currently owns and maintains eight publicly accessible Blink level-2 charging stations in the City.



















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Manage Units

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Charger	Name	Model	Status	Serial No. Location Name	
	LP Garage	WE-30CIRE		100189 City of Forest Grove	MANAGE
	Theater Lot South	PE-30KICE60		200997 Forest Grove - Theater Parking	MANAGE
	Theater Lot North	PE-30KICE48		200965 Forest Grove - Theater Parking	MANAGE
	College Way North	PE-30KICE48		103203 Forest Grove City Parking (College Way @ University)	MANAGE
	L&P South	PE-30KICE48		205491 Forest Grove Light & Power	MANAGE
	Council St South	PE-30KICE40		206490 Forest Grove - Auditorium Parking	MANAGE
	Council St North	PE-30KICE40		207835 Forest Grove - Auditorium Parking	MANAGE
	L&P North	PE-30KICE60		215685 Forest Grove Light & Power	MANAGE
	College Way South	PE-30KICE60		216497 Forest Grove City Parking (College Way @ University)	MANAGE

Four New EV Stations

- L&P is seeking to install four additional EV charging stations. The proposed locations are two on the NE corner of College Way and Pacific Avenue and two on the SE corner 21st Avenue and Cedar Street. These new EV stations would be connected, smart, and metered level two.
- L&P has received a grant from the Bonneville Environmental Foundation (BEF) to install these stations.
- These locations are highly accessible and trafficked by residents, students, and visitors alike. The location on College Way already includes a bike repair station and bus stop and will serve as an example of an alternative transportation hub in Forest Grove.

BEF GRANT FOR ADDITIONAL CHARGERS

Source	Amount	Funded by
EVSE Cost (4 units ¹ at \$4,000 per unit) ²	\$16,000	BEF
Installation Cost (Two sites, \$10,000 per site). ³	\$20,000	BEF
Networking and Service Fees for 5 years (\$250/station/year). ²	\$5,000	BEF
Repair and Maintenance for 5 years (\$200/station/year).	\$4,000	Forest Grove
Forest Grove L&P personnel time.	\$3,000	Forest Grove
Community outreach and engagement funding (space rental, display properties, printing collateral, media, refreshments, etc.)	\$2,000	Forest Grove
Forth staff time (ride and drive event, and other consumer engagement staff time) and collateral, support to administration and student organizations.	\$4,000	Forth
Pacific University (staff time marketing outreach and collateral).	\$1,000	Pacific University
Total:	\$55,000	

Hyundai Kona

- L& P recently purchased a Hyundai Kona to use day to day and to help promote EV usage.
- The Kona will be charged by solar that BEF helped fund, furthering the connection between clean, renewable energy and electric transportation.



How the Clean Fuels Program works.

- Passed in 2016, the purpose of the **Oregon Clean Fuels** Program is to reduce the amount of lifecycle greenhouse gas emissions per unit of energy by a minimum of 10 percent below 2010 levels by 2025.
- This reduction goal applies to the average of all transportation fuels used in Oregon, not to individual **fuels**.
- Charging EVs can deliver potentially valuable credits under this program, which rates transportation fuels on carbon intensity, a measure of the lifecycle emissions for a given amount of energy produced.

Example: Ashland Municipal Electric Utility

- The Ashland City Council approved the monetization of clean fuel credits accrued by Ashland Municipal Electric Utility (AMEU)
- As of June 2020, AMEU had 2,876 clean fuel credits. If monetized at the current credit price, the sale would yield \$345,120 for AMEU.
- Ashland, through AMEU, participates in the Oregon Clean Fuels Program.
- AMEU began participating in the program in 2018 and began generating credits in 2019. In 2020, the credits became available for sale.
- Credits generated through the program may be bought and sold using an online exchange hosted by the Oregon Department of Environmental Quality.
- AMEU receives clean fuel credits based on the operation of city owned electric vehicle charging stations and the registration of electric vehicles within the utility's territory. Electric vehicle registrations generate about 98% of utility's clean fuel credits. Ashland ratepayers are more than five times as likely to drive an electric vehicle than the Oregon average.

Forest Grove Clean Fuel Credits

- In 2020, L&P can begin to leverage clean fuel credits generated through public charging stations and electric vehicle registrations.
- L&P had 365 credits based upon 149 EVs registered in our service territory last year or approximately \$43,500 at the current credit rate.
- The numbers for 2020 are not out yet, but L&P expects there will be at least a few more EVs in our service territory. \$100 - \$150 / credit is a good range for planning purposes.
- Several organizations find a correlation between the number of charging ports and EV adoption rates. Lack of available charging ports is a primary reason for not buying an EV, and visually seeing more charging ports appears to correlate with higher EV acceptance. By adding more stations, Forest Grove aims to inspire greater EV adoption in its service area.

Requirements for Registered Parties:

- Regulated parties and credit generators who opt into the program are referred to as Registered Parties.
- Register with DEQ before producing fuel in Oregon, importing fuel into Oregon or generating or transacting credits for fuels supplied in Oregon;
- Keep records for each transaction of transportation fuel imported, sold or supplied for use in Oregon; and
- Submit quarterly annual reports using the DEQ-administered.
- L&P currently meets all these requirements.

Where & How to Invest Clean Fuel Credits?

- Public EV chargers.
- EV chargers at our schools.
- EV chargers in low income and under served areas.
- EV chargers at hotels and apartment complexes.
- Rebates for customers who install chargers in their homes.
- Invest in the City's fleet.

Council Guidance

- Location of our next four chargers?
- Charging for everyone?
- Clean Fuel Credits?
- Time of Use rates?
- Are we meeting the goals and objectives?

Next Steps

- Receive Council Feedback tonight.
- Develop EV Program including credits, EV locations, EV management, and EV incentives, and grant opportunities.
- EV Program to be adopted later by Council and incorporated into rates and fees.